

**Amendments to the Claims:**

This listing of claims will replace all prior versions, and listings, of claims in the application:

**Listing of Claims:**

1. (Currently Amended) A hard handoff method for making a mobile client continuously receive internet services by carrying out a hard handoff procedure with a target radio network upon encountering a hard handoff situation in the mobile client, comprising the steps of:

carrying out a hard handoff procedure with ~~a~~the target radio network upon encountering a hard handoff situation in the mobile client, including;

carrying out a radio connection between the mobile client and a target radio network when a handoff is requested;

establishing a Point-to-Point Protocol (PPP) link between the mobile client and a target packet data service node of the target radio network without closing a current traffic link;

carrying out a mobile IP registration procedure ~~for~~of the mobile client ~~and for to~~ the target packet data service node ~~of the target radio network without closing the current traffic links~~ after the PPP link is completed, comprising transmitting an agent advertisement message to the mobile client, and the mobile client transmitting an agent solicitation to the target packet data service node; ~~and~~

closing the channel of the mobile client to a current packet data service node after the mobile IP registration to the target packet data service node is completed; and

shifting a traffic channel of the mobile client to the target packet data service node from ~~a~~the current packet data service node after setting all links.

2. (Currently Amended) The hard handoff method of claim 1, wherein the mobile client carries out a setting of independent multiple ~~Point-to-Point Protocol (PPP) links~~

and their control functions, wherein the setting of the multiple PPP links is carried out in both the case when a frequency used in the target radio network and a frequency used in a currently serving radio network are the same and when they are not the same.

3. (Currently Amended) The hard handoff method of claim 2, wherein in setting the multiple PPP links, a channel allocation is carried out in a same when a same frequency-handoff is used in the target radio network and the currently serving radio network.

4. (Currently Amended) The hard handoff method of claim 2, wherein in setting the multiple PPP links, a frequency allocation and a channel allocation are carried out in case of a different frequency-handoff is used in the target radio network and the currently serving radio network.

5. (Currently Amended) The method of claim 1, wherein carrying out a the mobile IP registration procedure further comprises transmitting a registration request to an Authentication, Authorization and Accounting (AAA) server and receiving a mobile IP registration reply from the AAA server.

6. (Previously Presented) The method of claim 5, wherein the registration request is transmitted by the target packet data service node and the reply is received at the target packet data service node.

7. (Previously Presented) The method of claim 6, wherein the target packet data service node transmits confirmation of the mobile IP registration reply to the mobile client.